

United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

DATE MAILED: 07/17/2006

| FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. | |
|-------------|----------------------------------|---|---|--|
| 04/05/2004 | Sung Su Shin | | 1155 | |
| 07/17/2006 | | EXAM | INER | |
| RK | | HANEY, RIC | HANEY, RICHALE LEE | |
| e Road | | ART UNIT | PAPER NUMBER | |
| 7024 | | 3765 | | |
| | 04/05/2004 0 07/17/2006 RK | 04/05/2004 Sung Su Shin 0 07/17/2006 RK | 04/05/2004 Sung Su Shin 0 07/17/2006 EXAM RK HANEY, RIC | |

Please find below and/or attached an Office communication concerning this application or proceeding.

| | Application No. | Applicant(s) | | | |
|--|--|---|---------|--|--|
| | 10/816,860 | SHIN, SUNG SU | | | |
| Office Action Summary | Examiner | Art Unit | | | |
| | Richale L. Haney | 3765 | | | |
| The MAILING DATE of this communication app Period for Reply | ears on the cover sheet with the c | orrespondence ad | ldress | | |
| A SHORTENED STATUTORY PERIOD FOR REPLY WHICHEVER IS LONGER, FROM THE MAILING DA - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory period w - Failure to reply within the set or extended period for reply will, by statute, Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b). | TE OF THIS COMMUNICATION (6(a). In no event, however, may a reply be tim ill apply and will expire SIX (6) MONTHS from cause the application to become ABANDONE | N. nely filed the mailing date of this c D (35 U.S.C. § 133). | | | |
| Status | | | | | |
| 1) Responsive to communication(s) filed on 17 Ag | oril 2006. | | | | |
| • | action is non-final. | | | | |
| ,— | n for allowance except for formal matters, prosecution as to the merits is | | | | |
| closed in accordance with the practice under E | x parte Quayle, 1935 C.D. 11, 45 | i3 O.G. 213. | | | |
| Disposition of Claims | | | | | |
| 4) ☐ Claim(s) 1 and 3-6 is/are pending in the application 4a) Of the above claim(s) is/are withdraw 5) ☐ Claim(s) is/are allowed. 6) ☐ Claim(s) 1 and 3-6 is/are rejected. 7) ☐ Claim(s) is/are objected to. 8) ☐ Claim(s) are subject to restriction and/or | vn from consideration. | | | | |
| Application Papers | | | | | |
| 9) The specification is objected to by the Examine 10) The drawing(s) filed on is/are: a) access Applicant may not request that any objection to the Replacement drawing sheet(s) including the correct 11) The oath or declaration is objected to by the Ex | epted or b) objected to by the drawing(s) be held in abeyance. Section is required if the drawing(s) is ob | e 37 CFR 1.85(a). jected to. See 37 C | | | |
| Priority under 35 U.S.C. § 119 | | | | | |
| 12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of: 1. Certified copies of the priority documents 2. Certified copies of the priority documents 3. Copies of the certified copies of the priority application from the International Bureau * See the attached detailed Office action for a list | s have been received. s have been received in Applicat rity documents have been receive u (PCT Rule 17.2(a)). | ion No ed in this National | l Stage | | |
| Attachment(s) 1) \(\sum \) Notice of References Cited (PTO-892) | 4) 🔲 Interview Summary | | | | |
| 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Pager No(s)/Mail Date | Paper No(s)/Mail D 5) Notice of Informal I 6) Other: | | O-152) | | |

Art Unit: 3765

Response to Amendment

Applicants response filed 4/17/2006 has been considered. Claims 1, 5 and 6 have been amended. Claim 2 has been cancelled. Claims 1, 3 – 6 are pending in the application.

Specification

1. The amendment filed 4/17/2006 is objected to under 35 U.S.C. 132(a) because it introduces new matter into the disclosure. 35 U.S.C. 132(a) states that no amendment shall introduce new matter into the disclosure of the invention. The added material, which is not supported by the original disclosure, is as follows: "the pair of strings 7a, 7b in the weft-way are placed over 3 strings and then under the next 6 strings in warp-way." Applicant's original disclosure provided for at least two yarns in the weft-way and does not support the structure of the warp yarns.

Applicant is required to cancel the new matter in the reply to this Office Action.

Claim Rejections - 35 USC § 112

- 2. The following is a quotation of the first paragraph of 35 U.S.C. 112:
 - The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.
- 3. Claim 1 is rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter, which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had

Art Unit: 3765

possession of the claimed invention. Applicant's original disclosure provided for at least two strings (Page 4, line 7) but never discloses two positively.

Double Patenting

4. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., In re Berg, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); In re Goodman, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); In re Longi, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); In re Van Ornum, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); In re Vogel, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and In re Thorington, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

Claims 1 – 6 are rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claim1, 2, 3, 5, and 9 of Lee (US 6,928,659) in view of Young et al. (US 6,107,538). Although the conflicting claims are not identical, they are not patentably distinct from each other because the modifying the structure of the weave and denier size would have been an obvious variation to one of ordinary skill in the art at the time the invention was made, moreover modifying the weave structure and the previously recited 170D yarn to a micro denier does not produce a new or

Application/Control Number: 10/816,860

Art Unit: 3765

unexpected result. It is well known in the textile art the micro fibers are absorbent. Young et al. discloses a device used to absorb bodily liquids made from polyester fiber (Column 27, line 36) with a decitex range from 1-20 (Column 27, 64-66), which would equate to a denier range of 0.09 – 18. It is noted that the device of Young is not in the same field of endeavor; however, meets the combination requirements for a U.S.C. 103 rejection because the devices provides the same problem solving function. It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Lee by utilizing the low denier yarn range taught by Young et al. in order to obtain an absorbent fabric.

In regard to the yarn having twist at even intervals, it is well known in the art that uneven intervals are only used for specific functions, none of which apply to the claimed endeavor. It would have been obvious to a person of regular skill in the art at the time the invention was made to use a yarn with regular twist intervals in order to achieve regularity. It is noted that the it would have been obvious to use 100% polyester yarn in place of the disclosed fiber blend because the percentage of fiber used is not significant to the patentability of the sweatband.

a. In assessing the subject matter of product-by-process claims, it is necessary to bear in mind certain principles. Foremost among these is the principle that even though product-by-process claims are limited by and defined by the process, determination of patentability is based on the product itself. In re

Thorpe, 777 F.2d 695, 227 USPQ 964 (Fed. Cir. 1985); In re Brown, 459 F. 2d

531, 173 USPQ 685 (CCPA 1972); In re Pilkington, 411 F.2d 1345, 162 USPQ

Art Unit: 3765

145 (CCPA 1969). Thus, the patentability of a product does not depend on the method of production. Thorpe, supra. If the product in a product-by-process claim is the same as or obvious from a product of the prior art, the claim is unpatentable even though the prior product was made by a different process.

Thorpe, supra; In re Marosi, 710 F.2d 799, 218 USPQ 289 (Fed. Cer. 1983). The Court of Customs and Patent Appeals discussed these principles as well as the rationale for rejection of such claims over prior art disclosures of products in In re Brown, 459 F.2d 531, 173 USPQ 685 (CCPA 1972) as follows:

In order to be patentable, a product must be novel, useful and unobvious. In our law, this is true whether the product is claimed by describing it, or by listing the process steps used to obtain it. This latter type of claim, usually called a product-by-process claim, does not inherently conflict with the second paragraph of 35 USC 112. [citation omitted] That method of claiming is therefore a perfectly acceptable one so long as the claims particularly point out and distinctly claim the product or genus of products for which protection is sought and satisfy the other requirements of the statute. It must be admitted, however, that the lack of physical description in a product-by-process claim makes determination of the patentability of the claim more difficult, since in spite of the fact that the claim may recite only process limitations, it is the patentability of the product claimed and not of the recited process steps which must be established. We are therefore of the opinion that when the prior art discloses a product which reasonably appears to be either identical with or only slightly different than a product claimed in a product-by-process claim, a rejection based alternatively on either section 102 or section 103 of the statute is eminently fair and acceptable. As a practical matter, the Patent Office is not equipped to manufacture products by the myriad of processes put before it and then obtain prior art products and make physical comparisons therewith. (emphasis in the original, footnotes omitted).

Thus, although process limitations distinguishing the product over the prior art must be given the same consideration as traditional product characteristics, <u>In re Hallman</u>, 655 F,2d 212, 210 USPQ 609 (CCPA 1981), <u>In re Luck</u>, 476 F.2d 650, 177 USPQ 523 (CCPA 1973), and although product-by-process claims are limited by and defined by the process,

In view of the similarities between the claimed process, i.e. "twist at regular intervals", and that of the prior art of Lee, it is reasonable to believe that the product made by the prior art process would be either identical to or only slightly different from the claimed product. In such a situation, the burden of proof shifts to applicant to prove that the claimed product is materially different.

5. Applicant's arguments filed 4/17/2006 have been fully considered but they are not persuasive. Applicant's amendments have not placed the claims in condition for allowance due to issues of new matter.

Conclusion

6. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of

Art Unit: 3765

the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Richale L. Haney whose telephone number is 571-272-8689. The examiner can normally be reached on M-F 8:00 - 4:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Gary Welch can be reached on 571-272-4996. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Richale L. Haney Patent Examiner Art Unit 3765 July 10, 2006

RLH

GARÝ L. WELCH PRIMARY EXAMINER